

 Roland™

Fantom-X

Workshop



Smart Storage in the Fantom-X

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About the Fantom-X Workshop Booklets

The Fantom-X Workshop booklets explain some of the exciting features of Roland's Fantom-X family of products. Each Workshop booklet covers a single topic, and is intended as a companion to the Fantom-X manuals.

This booklet requires Fantom-X O.S. Version 2 or higher. To learn about the latest Fantom-X software, visit www.RolandUS.com, or call Roland U.S. Product Support at 323-890-3745.

Other Fantom-X Workshop Booklets

- *The Fantom-X Experience*—A quick tour of how the major Fantom-X creative tools interact.
- *The Sounds of the Fantom-X*—A tour of the Fantom-X sounds and Patch mode.
- *The Rhythms of the Fantom-X*—Exploring the pads, drum sounds, and rhythms of the Fantom-X.
- *The Fantom-X Effects*—This booklet helps you get the most out of the powerful effects processing in the Fantom-X.
- *Sequencing on the Fantom-X*—Learn how to record using the Fantom-X sounds and its full-featured sequencer.
- *Sampling on the Fantom-X*—Capture loops, vocals, or any other sound with the Fantom-X's built-in sampler.
- *Performing with the Fantom-X*—Splits, layers, realtime controllers, and more make the Fantom-X hot onstage.
- *Making a CD of Your Fantom-X Music*—Learn how to turn your Fantom-X music into a final audio CD.
- *Advanced Fantom-X Sequencing Techniques*—Learn how to use time-based effects, create arpeggios, work with mastering effects, and record realtime patch tweaks.
- *Audio Tracks*—This booklet explains how to record live vocals and instruments in your Fantom-X songs.

About This Booklet

The Fantom-X offers a rich assortment of musical tools, from its patches, rhythm sets and performances, to its songs, samples, rhythm patterns, arpeggios, and more. To further enhance the creative flow, the Fantom-X provides a speedy and intuitive working environment as well as a variety of places in which to store your work.

As you explore all that the Fantom-X has to offer, you'll inevitably want to know how to best preserve and keep track of your work materials. That's what this booklet's all about.

Understanding the Symbols in This Booklet

Throughout this booklet, you'll come across information that deserves special attention—that's the reason it's labeled with one of the following symbols.



A note is something that adds information about the topic at hand.



A tip offers suggestions for using the feature being discussed.



Warnings contain important information that can help you avoid possible damage to your equipment, your data, or yourself.

Making Memories

This section explains the Fantom-X's "memory," a geeky term for "the place it puts things." It's important to understand how its memory operates as you develop your own way of working on the Fantom-X.



The Fantom-X has quite a lot of stuff to hold onto, from its built-in waveforms on up to the songs you record. There are:

- *things the Fantom-X needs to do its job*—such as the PCM waveforms that provide the basis for patches and rhythm sets, the factory patches, rhythm sets and performances, the Fantom-X demos, their samples, and so on.
- *your own materials*—such as your patches, rhythm sets, performances, songs, samples, the user rhythm patterns, rhythm groups, arpeggios, and your system settings.

Since these materials are used in different ways, the Fantom-X utilizes three different types of memory, with each one perfectly suited to the stuff it holds.

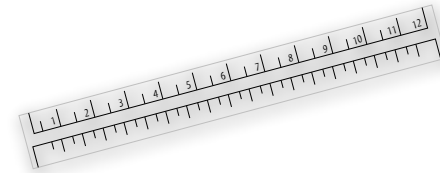
ROM

"ROM" is the acronym for "Read-Only Memory." It's called "read-only" because you can use what it holds, but you can't change, or "re-write" it, yourself. ROM's where the Fantom-X keeps its:



- *PCM waveforms*—These are the built-in sound recordings that the Fantom-X patches and rhythm sets play when they aren't playing samples you've captured or imported.
- *presets*—These are the preset factory patches, rhythm sets, performances, demos, and demo samples.

Detour—How the Fantom-X Measures Things



In the next few sections, we'll be talking about the sizes of certain things: memory sizes, song sizes, sample sizes. You'll see things described as being so many "K," "MB," or "GB" in size. If you know what these abbreviations mean, you can skip this section and head straight to the next one. If not, take a moment, and read on.

The Fantom-X measures objects by their size in bytes, as any computer-based device does. Even the smallest samples and songs are thousands of bytes in size, so their sizes are counted in thousands of bytes to make life easier: kilobytes, or "KB." But those are smaller samples and songs. Bigger ones are thousands of kilobytes in size—that's a million bytes, son—and they're measured in megabytes, or "MB." One form of memory in the Fantom-X can be a billion bytes in size, or 1 GB for "gigabyte."

Okay? Moving on...

RAM

"RAM" stands for "Random Access Memory," though that doesn't matter much here (computer historians, look elsewhere). What matters is what RAM is: lightning fast. Because of this, RAM makes an ideal place for holding things you're working with, or working on. When you play or edit most anything on the Fantom-X, it's in RAM.

While RAM makes a great workspace, it's temporary—each time you turn off the Fantom-X, its RAM is cleared of its contents. As a result, you can't actually store anything there. The Fantom-X provides a different sort of memory for permanent storage, as we'll see.



Audio tracks are a special case. Work RAM holds the audio tracks themselves. The samples that audio tracks play, however, reside in sample RAM. To learn more about audio tracks, see the *Audio Tracks Workshop* booklet.



We haven't mentioned effects because, technically, an effect is an element within a patch, rhythm set, or performance. Still, when you edit effects, that, too, takes place in work RAM.



We're sorry to repeat ourselves, but we can't emphasize this enough: Anything in RAM is there only temporarily. It's *critical* that you save your work to one of the Fantom-X's permanent storage areas to avoid losing it.



Whenever you edit something you've already saved, you're actually working on a copy it that's been loaded into RAM. This is great because it means that you're free to experiment as wildly as you like, secure in the knowledge that the original is safe and sound in permanent storage.

While most Fantom-X activities take place in its general-use RAM—an area we'll call "work RAM"—sampling has its own workspace we'll call "sample RAM."



In the *Fantom-X Owner's Manual*, work RAM is called the "temporary area." Sample RAM is called "temporary memory."

What Goes On In Work RAM

Outside of sampling, most everything you select, play, edit, and record in the Fantom-X is in work RAM while you're using it. When you:

- *select*—patches, rhythm sets, performances, songs, rhythm patterns, or arpeggios, they're loaded into work RAM.
- *edit*—patches, rhythm sets, performances, songs, rhythm patterns, rhythm groups, arpeggio styles, or chord memory forms, you do so in work RAM.
- *record*—sequencer tracks in a song, you do it in work RAM.

Work RAM has a pre-designated area for each of the items it holds. The currently selected patch is loaded into its own area, the current song goes into its own area, and so on.

Preserving Work RAM Work

Each time you select something new for one of these areas, it replaces what's currently there. Therefore, if you've been editing or recording, be sure to save your work to a permanent storage area before selecting something new to play or edit.

The Fantom-X helpfully provides some visual cues that let you tell at a glance if something you're viewing has been edited or recorded but hasn't yet been saved in its current state.

→ *USER:001 UltimatGrand EDITED

Patches, rhythm sets, and performances that need to be saved have an asterisk.

In other cases, you'll see the word "EDITED."

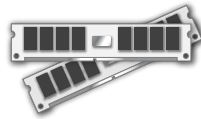
Later in this booklet, we'll tell you where you can learn about saving and loading all of the things that work RAM can temporarily hold.

What Goes On In Sample RAM

Sample RAM, logically enough, is where you work with samples in the Fantom-X. In fact, a sample has to be in sample RAM to be played or edited. All new samples go straight to sample RAM when they're first captured. When you record an audio track, its samples also go into sample RAM. You can load samples manually into sample RAM, or the Fantom-X can load them for you automatically at startup. You also import samples into sample RAM.

As shipped from the factory, the Fantom-X sample RAM is 32 MB in size, a good size for getting you started.

For more involved sampling work—and for recording audio tracks—you can expand sample RAM up to 544 MB by installing SDRAM memory chips, as explained on Page 244 of the *Fantom-X Owner's Manual*. This provides ample room for even the largest samples and longest audio tracks.



The *Sampling on the Fantom-X* Workshop booklet discusses the use of sample RAM in detail, and explains how to capture, edit, play, save, load, and import samples. It also explains how to set up the Fantom-X to load samples for you automatically.

Preserving RAM Samples

Since sample RAM is cleared each time you power-off, it's *absolutely vital* that you save all of the new samples and audio tracks you want to preserve—as well as any sample you've been editing—to a permanent storage area before turning off the Fantom-X. Otherwise, they'll be lost. Yes, this is the third time we've said this—it's important.

Store, Then Play

When you play a sample on the Fantom-X, you play it in a patch or rhythm set. Sample-playing patches and rhythm sets identify their samples by their storage locations, so it doesn't make sense to use a sample in a patch or rhythm set until it's been stored. Store the patch in permanent memory before using it in a patch or rhythm set.

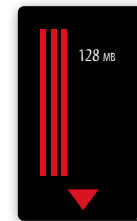
Flash: User and Card Memory

For permanent storage of your work, the Fantom-X uses a type of memory called “flash” memory. Flash provides a very secure place for the permanent storage of your data. The Fantom-X offers two kinds of flash memory in which to keep your work:

- *user memory*—The Fantom-X provides 32 MB of built-in flash memory, referred to as “user” memory.
- *card memory*—You can install a PC card (purchased separately) in the Fantom-X's rear-panel PC CARD slot to add up to 1 GB of additional flash storage space. You can also use a Compact Flash or Smart Media card with a Compact Flash-to-PCMCIA or Smart Media-to-PCMCIA adaptor. Swapping multiple cards in and out of the Fantom-X gives you lots of extra storage space.



From now on in this booklet, when we refer to “PC card” or “memory card,” we mean all three types of cards that can be used in the Fantom-X.



PC Card



Compact Flash
card



Smart Media
card



The Fantom-X Owner's Manual has details on installing memory cards, and formatting them for use on the Fantom-X.



When we refer to “card memory” later in this booklet, we’re referring to the memory on the currently installed PC card.

Um, “Two Types of Flash.” Except for the Third.

The Fantom-X has another—less visible—area of flash memory that stores “system” settings. On some screens, you’ll see F8 (System Write), which allows you to store the displayed settings. Many system settings apply to the Fantom-X’s global behavior; others are Patch mode settings. Enough said.

Getting Loaded

Whatever’s stored in user or card memory must be loaded into RAM for use. Most of this occurs pretty much invisibly, though some items have to be deliberately loaded. To use stored:

- *patches, rhythm sets, rhythm patterns and groups, arpeggio styles, and chord forms*—simply select them. The Fantom-X instantly puts them in work RAM.
- *songs*—use Load Song or Load Song + Samples on the Save/Load screen to load a song into work RAM.
- *samples*—load the desired samples into sample RAM from the Sample List screen, or let the Fantom-X automatically load them for you at power-up, as described in *Sampling on the Fantom-X*.

You can actually listen to songs—though not their audio tracks—without loading them into RAM. Use the Quick Play and Chain Play features described on Page 164 in the *Fantom-X Owner's Manual*. To edit or otherwise work with songs—and to hear their audio tracks—they must be loaded into RAM.



Saving and Loading User and Card Memory

In this booklet we’re concerned with how memory and storage in the Fantom-X work. While we’ll get into some key storage and memory techniques later, we won’t be going into the actual saving and loading of individual items. To learn how to save and load:

- *patches*—see the Workshop booklet *The Sounds of the Fantom-X*.
- *rhythm sets, rhythm patterns, and groups*—see the Workshop booklet *The Rhythms of the Fantom-X*.
- *performances*—see the Workshop booklets *Recording Music on the Fantom-X* or *Performing with the Fantom-X*.
- *songs*—see the *Recording Music on the Fantom-X* and *Audio Tracks* Workshop booklets.
- *samples*—see the *Sampling on the Fantom-X* Workshop booklet.
- *arpeggio styles*—see the *Advanced Fantom-X Sequencing Techniques* Workshop booklet.
- *chord forms*—see the *Performing with the Fantom-X* Workshop booklet.

What User and Card Memory Can Hold

Here’s what can be stored in user memory and what can be stored in card memory.

Data Type	User memory	Card memory
Patches	256	256
Rhythm sets	32	32
Performances	64	64
Shared space: samples and songs	up to 32 MB*	up to capacity**

Data Type	User memory	Card memory
Rhythm patterns	256	0
Rhythm groups	32	0
Arpeggio patterns	128	0
Chord memory	64	0

* up to 2,000 samples; ** up to 7,000 samples

Snug Fit

User and card memory both contain pre-assigned memory locations for the storage of 256 patches, 32 rhythm sets, and 64 performances, and user memory also has locations for holding rhythm patterns, arpeggio styles, and chord forms.

This is possible because each of these items is always precisely the same size—it's a simple matter of math for the Fantom-X to set aside sufficient space for them in user and card memory.



Like a hand-in-glove

Give Me Those Wide-Open Spaces



The remainder of user memory and card memory is wide-open space that's shared by samples and songs. This is because samples and songs vary in size. A lot.

Samples can be as small as a few kilobytes, or as large as your sample RAM can hold—and if your sample RAM's been expanded to 544 MB, that's room for a very large sample. Likewise, songs can grow from about 200 K to over 4 MB.

Because the Fantom-X has no way to know in advance the sizes of your own personal samples and songs, it's simply impossible for it to set aside pre-sized locations for storing them. Therefore, most of user and card memory is a big shared area for the storage of samples and songs.

As you fill up user or card memory, you can see how much room you need for the samples you're saving so you can tell if everything'll fit. We'll explain how to do this later.



The *Sampling on the Fantom-X* Workshop booklet offers some helpful strategies for storing samples and the patches, rhythm sets, and songs that use them.

Why You'd, Well, Use User Memory

User memory's very handy, since it's built into the Fantom-X—it's always there. It doesn't cost any additional money, of course, and it frees you from having to remember where you put your stuff. On the other hand, depending on how you'll be using the Fantom-X, the amount of data it can hold may or may not be enough for you.

Why You'd Use Card Memory

Though a memory card requires an additional expenditure, it provides some definite benefits:

- *It's removable*—When you fill up a card, you can just pop another one in. This provides you as much Fantom-X storage space as you can afford.
- *It can hold the contents of expanded sample RAM*—If your samples are going to require more space than 32 MB, they won't fit in user memory. You'll simply *need* a memory card.
- *You can keep data for different projects on different cards*—Simply pop in a card and have access to all the materials you need in any given situation.
- *It can store a backup of the entire contents of user memory*—You can perform a User Backup onto a card that's 32 MB in size or larger. We'll discuss this procedure later on.

Storage and Memory-Related Techniques

The following sections discuss the Fantom-X's memory management tools.

Learning How Much Space You Have and Need

- *When you're saving data*—you only need to be concerned about having enough room for your samples and songs, since everything else has a fixed, sufficient amount of pre-allocated space, as we mentioned earlier. And since songs are usually small enough to fit the available space, it's really your samples' size requirements you'll need to pay attention to.
- *When you're loading data*—your only concern is having enough room for your samples, since work RAM always contains enough room for everything else.

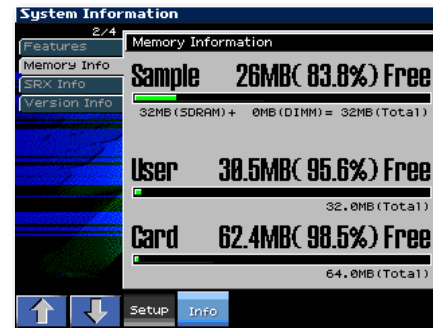


In truth, you don't really have to get too bent out of shape figuring out if you have enough space for samples, or songs—if you try to save, or load, something for which you don't have enough room, the Fantom-X will let you know. Still, if you don't like surprises....

The Memory Information Display

The Fantom-X's Memory Information display shows the amount of data currently in sample RAM, user memory, and card memory, and how much free space is available. To get there:

1. Press PATCH/RHYTHM, LAYER/SPLIT, or MIXER.
2. Press MENU.
3. Select System and press ENTER.
4. Press F4 (Info).
5. Press F2 (↓) or F1 (↑) to select the Memory Info tab.



This Fantom-X has a new 64 MB memory card installed.



The area labeled "Sample" shows sample RAM's memory use.

In each of the three memory areas, you can see:

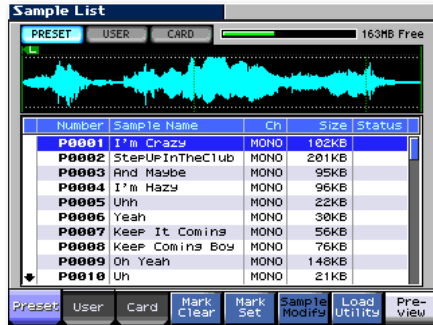
- *how much space is now being used*—as a green bar in the area's memory gauge.
- *how much space is still left*—as the dark part of the memory gauge, and as a memory readout above it.

Finding Out How Much Space You Need

When You're Storing Your Work

The Fantom-X allows you to check out the size of your samples before saving them—you can store samples individually or store everything in sample RAM at once, as described in the *Sampling on the Fantom-X Workshop* booklet. To learn the size of:

- *any currently loaded sample*—press SAMPLE LIST to display a list of all of your samples. The size of each currently loaded sample is displayed to its right.



- *the entire contents of sample RAM*—consult the Memory Information display's Sample readout, as described on Page 8.



If space is tight in the memory area to which you're saving your data, it's possible you'll have room for your samples, but not quite enough for your song—if so, the Fantom-X will display a "Memory Full" message.

When You're Loading Your Work

You can view the size of samples you want to load on the Sample List screen.

Using the Fantom-X File Utility

The Fantom-X's File Utility feature allows you to delete, move or copy data stored in user and card memory so you can re-arrange and organize it however you want.

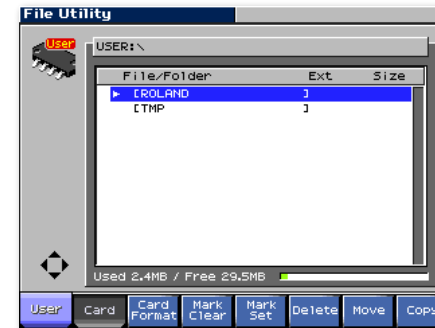
What you'll see in the File Utility screen are folders and files that look and act just like folders and files on a computer's hard drive.

Getting to the File Utility Screen

1. Press PATCH/RHYTHM, LAYER/SPLIT, or MIXER.
2. Press MENU.
3. Highlight "File Utility."



4. Press ENTER—the File Utility screen appears.



If you've previously connected the selected memory area to a computer running Mac OS X, you may see additional items that begin with a period. Ignore these files—they're required by Mac OS X.

5. Press F1 (User) or F2 (Card) to select the area of memory that contains the data with which you want to work.

Navigating the File Utility Screen

When you arrive at the File Utility screen, you're shown the two top-level folders in the memory area you've selected. By burrowing down into them, you can locate the files you want to examine, delete, move, or copy.

The simplest way to move in and out of folders—and to select files—is to use the ◀, ▶, ▲, and ▼ CURSOR buttons. Press:

- ▶—to view the contents of the currently highlighted folder. (This opens the folder.)
- ◀—to see what's in the folder that contains the one whose contents are currently displayed. (This moves you back up one level in the selected memory area's directory structure and closes the current folder.)
- ▼—to highlight the next item down in a displayed list.
- ▲—to highlight the next item up in a displayed list.

Deleting a File

To delete the currently highlighted file:

1. Press F6 (Delete)—the Fantom-X asks if you're sure you want to erase the file.



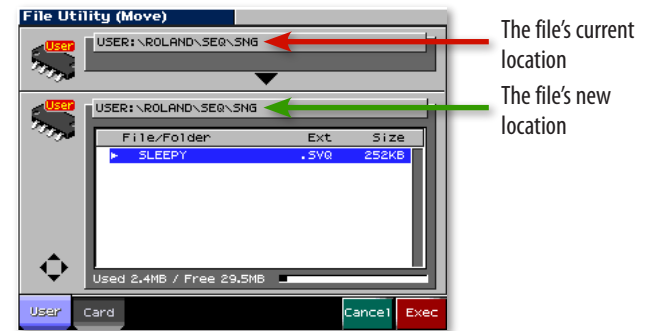
If you delete a file, it's gone forever, so move slowly and be sure you're ready to proceed.

2. Press F8 (Exec) to delete the file, or F7 (Cancel) to abort the operation.

Moving a File

To move the currently highlighted file to a different memory location:

1. Press F7 (Move)—the Fantom-X presents you a screen in which you can select the desired new location for the file.



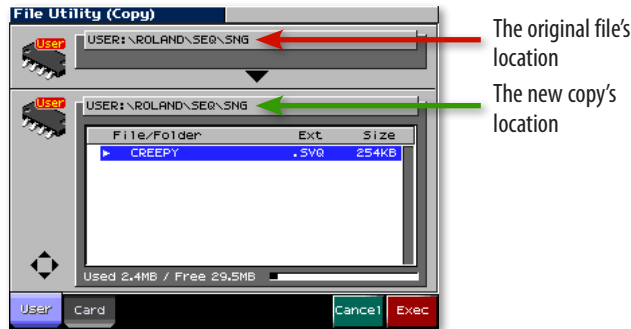
2. Use F1 (User), F2 (Card), and the usual File Utility navigation methods to display the desired new location for your file.
3. Press F8 (Exec)—the Fantom-X asks if you're sure you want to move the file.
4. Press F8 (Exec) to move the file, or F7 (Cancel) to abort the operation.

Copying a File

When you copy a file, the original remains in its current location, and a copy of the file is placed in another location you select during the process.

To copy the currently highlighted file to a different location:



1. Press F8 (Copy)—the Fantom-X presents you a screen in which you can select the desired location for the file copy.



- Use F1 (User), F2 (Card), and the other File Utility navigation methods to display the desired location for the file copy.
- Press F8 (Exec)—the Fantom-X asks if you're sure you want to copy the file.
- Press F8 (Exec) to copy the file, or F7 (Cancel).

Backing Up Your Work on the Fantom-X

You can make a copy of everything that's in your user memory, storing it all on a memory card. The procedure is called a "User Backup," and it's a simple way to make a copy of your work for safekeeping. Should you wish to return the backup to user memory, simply perform a "User Restore" operation.

-  A User Backup memory card must have at least 32 MB free space available.
-  Each memory card can accommodate a single user backup, regardless of the card's capacity.

The User Backup and User Restore operations both take place on the Fantom-X's Utility screen. To get there:

- Press PATCH/RHYTHM, LAYER/SPLIT, or MIXER.
- Press MENU.
- Highlight "Utility."



- Press ENTER—the Utility Menu screen appears.

Creating a User Backup

User Backup

Backup all user data to the memory card.

- Install the formatted memory card on which you want to store your backup.
- Navigate to the Utility screen as described above.
- Either:
 - Use ◀, ▶, ▲, or ▼ to select User Backup and press ENTER, or
 - Press F1 (User Backup)—the Fantom-X asks you to confirm that you'd like to proceed with the operation.
- Press F8 (Exec) to proceed, or F7 (Cancel).

Restoring a User Backup

User Restore

Restore all the data on memory card to user area.

- Install the memory card on which your backup is stored.
- Navigate to the Utility screen as described above.
- Either:
 - Use ◀, ▶, ▲, or ▼ to select User Restore and press ENTER, or
 - Press F2 (User Restre)—the Fantom-X asks you to confirm that you'd like to proceed with the operation.



When you restore a user backup, the backup completely replaces the contents of user memory. If there's anything there you wish to preserve, store it to a memory card before performing a User Restore operation.

4. Press F8 (Exec) to proceed, or F7 (Cancel).
When your data has been returned to user memory, the Fantom-X displays, "Please Power Off."
5. Turn the Fantom-X off and then back on.

Backing Up Your Work On a Computer

When the Fantom-X is connected to a computer via USB, you can back up your work on the computer's hard drive. You can restore this data to the Fantom-X if and when you wish to. The backup method depends on the type of data. To back up:

- *songs and samples*—in card or user memory, copy the songs and sample files to and from the computer's desktop.
- *everything else*—in user memory, use the Fantom-X's Version Two (or higher) Librarian software.

Computer Backup for Songs and Samples

Connecting Via USB



This procedure is possible only with USB-supporting computers using the following operating systems: Windows XP/2000/Me or higher, Mac OS X, or Mac OS 9.04 or higher.



When USB communication is turned on, do not unplug the USB cables connecting the Fantom-X and the computer.

Before connecting the Fantom-X to your computer via USB and activating communication, perform the following steps:

1. Press the MENU button on the Fantom-X, and then turn the VALUE knob to select System.

2. Press ENTER.
3. Press F1 (↑) and/or F2 (↓) to select the USB tab.
4. Set USB Mode to STORAGE by turning the VALUE dial counter-clockwise until the Message from the Fantom-X window appears—press F8 (OK) to proceed.
5. Press F8 (System Write) to store the new setting.
6. Turn off the Fantom-X and start up your computer.
7. Using a USB A/B-type cable, connect the A-type USB plug to a USB jack on your computer, and the other end to the B-type USB jack on the Fantom-X.



8. Turn on the Fantom-X.

To activate the USB connection:

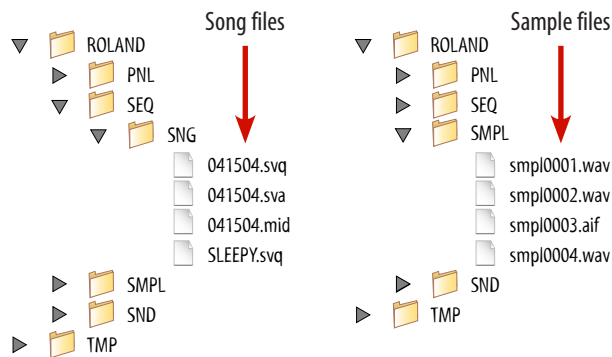
1. Press PATCH/RHYTHM and then the MENU button.
2. Turn VALUE to select USB Storage, and then press ENTER—the USB Select screen appears.



4. On this screen, you allow your computer access to your user memory or your card memory. To choose:
 - *user memory*—press F3 (Internal).
 - *card memory*—press F6 (Memory Card).

The Fantom-X displays “Connected” when communication is established. The Fantom-X’s user or card memory appears on the computer in a new window or on the desktop as a removable storage device. User memory appears as “FANX USER.” Card memory appears as “FANX CARD.”

- Open FANX USER or FANX CARD on your computer. Songs files and sample files can be copied from—and must be restored to—the same specific folders in user and card memory. Here’s where you’ll find them:



There are three types of song-related files. .svq files are Fantom-X song files, .sva files contain audio track playback events, and .mid files are Standard MIDI File-format versions of Fantom-X songs. To learn more, see the *Recording Music on the Fantom-X* and *Audio Tracks* booklets.

Sample files can be .wav-format files or .aif-format (AIFF) files.

A sample’s file name reflects its location in user or card memory, not its name as shown on the Fantom-X. Therefore, to ensure that it’s restored to its original memory location in the Fantom-X, don’t rename the file.

When you restore a sample file, it replaces whatever’s currently in its user memory location—if there’s a sample there you want to keep, save it to another location before restoring your sample file.

- Perform the desired backup or restore procedure.
- When you’re done, eject the Fantom-X’s memory area from your computer as you would any removable device.

To Back Up a Song or Samples to the Computer

Copy each Fantom-X file you wish to back up from its location in the Fantom-X memory area mounted on your computer’s desktop to the desired place on your computer’s hard drive.

To Restore a Song or Sample from the Computer

Copy each Fantom-X file you wish to restore from its location on the computer’s hard drive to the appropriate folder in the Fantom-X memory area mounted on the computer’s desktop.

Computer Backup for Everything Else

You can back up the following items from user memory to your computer’s hard drive using the Fantom-X Version Two Fantom-X Librarian software program:

- patches
- rhythm sets
- performances
- rhythm patterns
- rhythm groups
- arpeggio styles
- chord forms

This form of backup is more customizable than performing an internal User Backup—described in the previous section—since you can choose the data you want to back up instead of always backing up everything.

To learn if your computer can run the Fantom-X Librarian software, see Page 237 of the *Fantom-X Owner’s Manual*.

If you want to back up something stored on a memory card, move it to user memory in order to make it available to the Librarian software.

Installing the Librarian Software



Use of the Fantom-X Librarian software requires a working knowledge of your computer. Consult the computer's documentation to learn more.

Your Fantom-X—or your Version Two upgrade—shipped with the Fantom X Editor Ver. 2.0 dual-platform CD-ROM. (The latest version of this software can also be downloaded from the Roland US Web site.)

When you open the CD-ROM on your computer, you'll see a folder called "Fantom-X Editor Installer (E)." Inside this folder is a program—FantomX Editor Installer—that installs both the Version Two Fantom-X Editor and Librarian programs on your computer. Double-click the installer file and follow the onscreen instructions to install the software.

Librarian Connections

The Librarian software can communicate with the Fantom-X in either of two ways. Communication can occur through a:

- *USB connection*—when the Fantom-X's USB Mode parameter is set to MIDI.
- *MIDI interface*—when the computer is correctly configured for MIDI operations.

One advantage to using a MIDI interface is that the Librarian program doesn't require the Fantom-X to be in Librarian mode when communicating via MIDI. USB connections require the use of Librarian mode, which temporarily disables all other functions.



Before launching the Librarian program:

1. Locate the Roland folder on your hard drive and open it.
2. Open the Fantom-X Editor folder.
3. Open the Manual folder and double-click the file to display the Librarian manual in your Web browser.

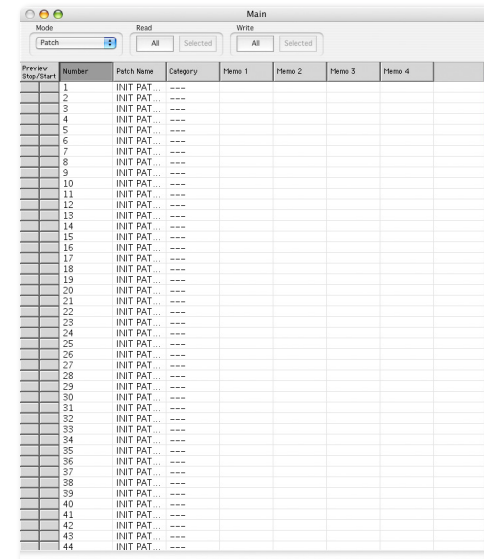
4. Follow the instructions for making the necessary connections.



The Librarian documentation is also available in the Help menu within the Librarian program.

Librarian Backup Procedure

Once you've set everything up, launch the Librarian program—its Main window opens.



The Librarian has a few appearance-related settings in its Setup menu. Here, we've turned on its gridlines and selected a font we like.

It's in this window that you pass things back and forth between the Fantom-X and the computer.

The Mode pop-up menu selects the type of data to be transferred. You can:

- *Read*—data from the Fantom-X’s user memory into the Librarian program.
- *Write*—data from the computer into the Fantom-X’s user memory.

Once you’ve selected the type of data you want to read into the Librarian, you can choose to retrieve:

- *data from all user memory locations*—by clicking Read All, or
- *data from a specific user location*—by clicking the desired location to highlight it, and then clicking Read Selected.



To read multiple items, Alt-click (Windows) or Command-click (Mac) them before clicking Read Selected.



The Read Selected button is available only when one or more items are highlighted in the Main window.

The Librarian reads your data from the Fantom-X and presents it in the Main window.

To back up your data, select New from the Librarian’s File menu to open a new Library file and its window. Then:

1. Select any desired items in the Main window, and then copy them using your computer’s Copy command.

Preview/Stop/Start	Number	Patch Name	Category	Memo 1	Memo 2	Memo 3	Memo 4
	1	UltimatG...	PNO				
	2	Strobot	PLS				
	3	Full Strings	STR				
	4	The Vort...	FX				
	5	Purple Dr...	ORC				

2. Select the desired location in the Library window, and then paste the selected items into the Library.



You can save as many Library files of your data as you like. Each Library can hold whatever you want to put in it. This allows you to create backups of particular projects’ data, or back up by calendar date, and so on.

Librarian Restore Procedure

1. Launch the Librarian software—its Main window opens. Set the window to display the type of data you want to restore to the Fantom-X’s user memory.
2. Open the Library file containing the data you wish to restore to the Fantom-X.
3. Select data you wish to return to the Fantom-X, and then copy it into the Main window at the desired locations using copy-and-paste.
4. To send the Fantom-X:
 - *data from all currently displayed Main window memory locations*—click Write All, or
 - *data from a specific user location*—click the desired location to highlight it, and then click Write Selected.



The Write Selected button is available only when one or more items are highlighted in the Main window.

Preview/Stop/Start	Number	Patch Name	Category	Memo 1	Memo 2	Memo 3
	1	Full Strings	STR			
		End Of Line				

3. Repeat the entire procedure for all types of user memory data you want to back up to your hard drive. You can store everything in the same Library, or create new Libraries.
4. With the Library window active, select Save (in the File menu) to store your Fantom-X data on your hard drive.
5. Quit the Librarian program when you’re done.

The data is restored to the Fantom-X's user memory.

5. Repeat the procedure for any remaining data you wish to restore to the Fantom-X's user memory.
6. Quit the Librarian program when you're done.



The Librarian has other handy features we haven't discussed here—check out its documentation for more information.

The End

We hope you've found this guide to the use of the Fantom-X's workspaces and storage capabilities informative and helpful. Check out the other Workshop booklets, as well your *Fantom-X Handbook*, *Owner's Manual*, and *Audio Track Expansion* guide. We're confident you'll have a great time with the exciting, inspiring Fantom-X.



For the latest Fantom-X updates and support tools, visit the Roland U.S. Web site at www.RolandUS.com. If you need personal assistance, call our amazing Product Support team at 323-890-3745.